

receiving a target identifier that indicates which data object is the target data object to be displayed on the visual display unit;

receiving a list of data object identifiers, each data object identifier indicating one data object resulting from searching the information location mechanism;

receiving the target data object;

creating a navigation control with one navigation element for each data object in the list, with the exception of the target data object, wherein the navigation control uses less display area than the display area occupied by the aggregate of the titles of every data object in the list; and,

sending the data object and the navigation control to the client process;

thereby saving a user time by enabling the user to access any data object that met their search criteria while viewing any target data object and without returning each time to the list of data objects resulting from their search.

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#### **Remarks - General**

Applicant has rewritten the Claims 1 to 33 as new Claims 34 to 66 to describe the invention more distinctly so as to overcome the technical rejections and define the invention in a patentable manner over the cited prior art.

#### **Claim Objections as to Informality**

Parenthetical abbreviations such as (SDVS) and (VDU) have been removed from all claims, with all terms spelled out in full.

Claim 29, which is new Claim 62, has been rewritten in independent form.

**Claim Rejections - 35 USC §112**

Claims 1-33 were rejected under §112 as being indefinite. Claim 1 has been rewritten as new claim 34 to make it clear that the target data object is the data object which is to be displayed on the visual display unit. As a whole, new claim 34 now distinctly claims the invention's subject matter: providing **direct** access to **every** data object resulting from a search while displaying **any** of these data objects.

Applicant believes that new claim 34 clearly distinguishes the invention's subject matter (enhancements when displaying the contents of a single data object) from the "result list" which is the prior state in the search process (displaying brief information about each of several data objects that result from the search). For example, a system that displayed the result list would not have an instruction port to identify a specific target data object as there is no specific target data object on the result list. Nor would a result list system require a data port to receive a data object, as all it requires is brief information about each of several data objects (which, in the prior art, generally come from an index). Similarly, a result list system would not send a data object to an output port, as no actual data object is displayed.

Applicant believes that a general term such as "data object" is required here since the "thing" a user is searching for varies by context. On a general-purpose search engine such as Google, the "thing" is a document. On a job search site that aggregates information from the job openings listed on individual employer's Web sites, the "thing" is a job which was just a portion of a document. In an "address book" software package, the "thing" is a record stored in a database management system.

The specification and drawings refer informally to the "current data object" and formally to the "target data object" as synonyms. Applicant believes that this usage will be understood in the context of the specification by one of ordinary skill in the art. If the Examiner believes that the application will be more clear by choosing one term or the other ("current" or "target"), and if the Examiner agrees that such a change does not introduce new matter, applicant is willing to

alter the specification and/or drawings to replace any or all occurrences with "current" or "target" or even "current target".

Claim 1 has been rewritten as new claim 34 to provide proper antecedent basis for the limitations "the target data object", "the title", "the result list", and "the result". The limitation "the mechanism" from claim 1 is not material and has been deleted due to insufficient antecedent basis.

The target identifier, the list, and the target data object were said to be unclear. Claim 1 has been rewritten as new claim 34 to clarify these items. The list is a list of search results, the target data object is the particular result which is to be displayed by applicant's invention. The target identifier indicates (or, informally, "points to") the target data object. This usage of the term "identifier" is consistent with related usage in computer science, e.g. "identifier" is the formal name for what programmers casually refer to as a "variable name" in program code.

Related claims have been revised in a similar manner.

Claim 29 has been rewritten as new claim 62 in independent form, and to provide proper antecedent basis for the limitations "the navigation control", "the data port", and "the output port".

Claim 33 has been rewritten as new claim 66 to provide proper antecedent basis for the limitations "the target data object", "the list of data object identifiers", "the title", and "the result list".

Applicant submits that the revised specification now complies with §112 and therefore requests withdrawal of this objection.

#### **Claim Rejections - 35 USC §103**

Claims 1-15, 19 and 24 were rejected under §103 as being unpatentable over SCALEPlus (SCALEPlus User manual, Version 3.0, 20/1/98).

**SCALEPlus does not provide access to EVERY data object when displaying a specific data object**

SCALEPlus supports "Full Text Searching - Through the Verity Search Engine" (page 4) and "Previous and Next Document in a Results List navigation without going back to the Results List" (pages 4 and 9). The limitations of these exact features, including a specific reference to the Verity search engine (which is a market leader), are discussed in the patent application as filed (applicant, p. 5, lines 3-10). The key novel feature of applicant's invention is to link to EVERY document (or, in general, every data object) in the result list rather than just to the previous and next documents. Despite a very wide variety of search products and services in several intensely competitive markets, no known search includes the novel, time-saving features of applicant's invention. Thus, applicant asserts that the novel feature is not obvious and is patentable over SCALEPlus and therefore requests withdrawal of this objection to claims 1, 29 and 33, which are new claims 34, 62 and 66.

**Dependent claims**

Applicant believes that dependent claims 2-28, modified with technical corrections as new claims 35-61, are allowable limitations on new claim 34. A few are discussed below to contrast with SCALEPlus.

Regarding dependent claim 7, which is new claim 40, the SCALEPlus documentation provided by Examiner does not indicate that it teaches a navigation element for the current target data object, i.e. the document currently being displayed. SCALEPlus teaches only previous and next links, no "current" link. And, such a "link" would be quite surprising, since it serves no purpose in SCALEPlus. It would not go anywhere, as the current document is already displayed. The additional element in this claim is relevant to applicant's invention to provide a stable visual representation independent of which data element is the current target.

Dependent claims 11 and 14, which are new claims 44 and 47, each add a limitation that applicant's invention ALSO creates a previous or next link. While SCALEPlus does teach a

previous and next link, it does not teach a system that links to every data object and thus does not include all of the elements of applicant's invention.

Dependent claims 24-25, which are new claims 57-58, specify two different ways to implement the target identifier: directly, i.e. the target identifier is a data element identifier, and indirectly, i.e. the target identifier is an index into a separate list of data element identifiers. The SCALEPlus documentation provided by Examiner does not indicate that it teaches either of these limitations. Nor is that surprising; the manual is addressed to users not to developers who would implement a system.

Dependents claim 26-27, which are new claim 59-60, specify that the list of data objects could be coupled to storage and identified via an added list **identifier** port. As above, the SCALEPlus documentation does not discuss implementation. A typical search system such as SCALEPlus will contain a list port, but need not contain a list **identifier** port as this adds additional features above and beyond mere search.

Applicant believes that dependent claims 30-32, modified with technical corrections as new claims 63-65, are allowable limitations on new claim 62.

### **Conclusion**


For all of the above reasons, applicant submits that the specifications and claims are now in proper form, and that the claims all define patentably over the prior art. Therefore applicant submits that this application is now in condition for allowance, which action is respectfully solicited.

### **Conditional Request for Constructive Assistance**

Applicant has amended the specification and claims of this application so that they are proper, definite, and define novel structure which is also unobvious. If, for any reason, this application is not believed to be in full condition for allowance, applicant respectfully requests the constructive assistance and suggestions of the Examiner pursuant to M.P.E.P. §2173.02 and

§707.07(j) in order that the undersigned can place this application in allowable condition as soon as possible and without the need for further proceedings.

Very respectfully,

  
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Date

05-05-2004

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